



Childhood and Adolescent Immunization Rates Have Gone Up In Montana

When the results of the 2008 National Immunization Survey (NIS) revealed immunization rates for children aged 19–35 months in Montana were among the lowest in the United States, a call to action was initiated. Public health officials recognized the NIS results indicated too many Montanans were at risk for vaccine preventable diseases.

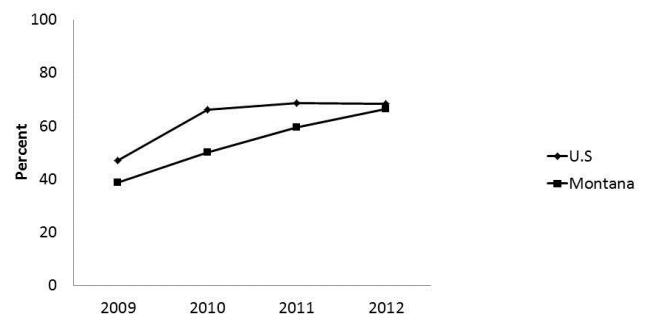
The data demonstrated low immunization rates were not likely to be caused by vaccine hesitancy alone, but rather by missed opportunities to immunize. Furthermore, while children were routinely immunized for many vaccine-preventable diseases, missed doses likely contributed to low immunization rates. With this information, the Montana Immunization Program implemented a comprehensive strategy aimed at increasing childhood and adolescent immunization rates. Initiatives included but were not limited to strengthening the standardization and review of immunization requirements in licensed childcare facilities, upgrading the Montana immunization information system (imMTrax), and enhancing reminder/recall processes. It is unknown which of these strategies, if any, had measurable impact.

The purpose of this issue of *Montana Public Health* is to describe the latest NIS data which indicate important progress in increasing both childhood and adolescent immunization rates since 2008.

Childhood immunizations The immunization rates among children aged 19–35 months are improving in Montana. The overall immunization rate is for 4 DTaP, 3 Polio, 1 MMR, 3 Hib, 3 Hepatitis B, 1 Varicella, and 4 PCV (4:3:1:3:3:1:4). The rate in Montana is now equivalent to the average rate in the U.S. (Figure 1). In 2012, 67% of Montana children were considered up-to-date for the 4:3:1:3:3:1:4 series compared with the U.S. rate of 68%. The percentage of Montana children considered up-to-date increased from 39% in 2009.¹

Adolescent immunizations In general, immunization coverage for all recommended adolescent vaccinations increased from 2009 to 2012. Coverage among Montana adolescents for both Tdap and the HPV series (female only) was above the national average. In 2012, immunization coverage rate among Montana adolescents for ≥ 1 Tdap was over 90% (Figure 2). Notably in 2011, Montana had already achieved the Healthy People 2020 goal of 80% or more of teens having received 1 dose of Tdap. Additionally, among females who started the HPV series, 85% completed the series. Montana ranks at or near the top of states in the nation for this measure.

Figure 1. NIS Estimated Vaccination Coverage* Among Montana and United States Children Aged 19–35 Months, 2009–2012



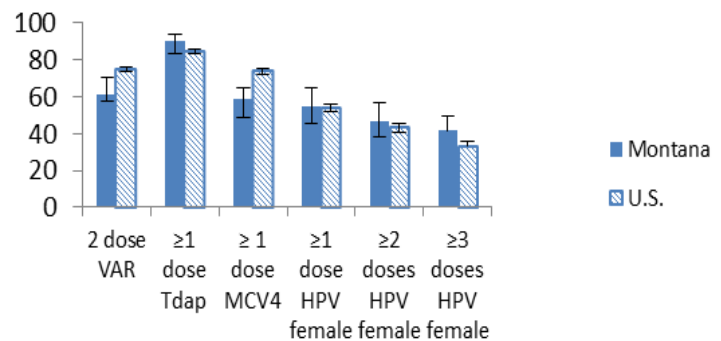
*4 DTaP, 3 IPV, 1 MMR, 3 Hib**, 3HepB, 1 Varicella, and 4 PCV

**Full series Hib: ≥ 3 or ≥ 4 doses of Hib vaccine depending on product type received (includes primary series plus the booster dose)

In contrast, the coverage rate for meningococcal vaccine, 58%, is below the national average of 74% and the coverage level for two doses of varicella vaccine is 61%, 13 percentage points lower than the national average (Figure 2). The coverage rate for even one dose of the HPV series for males is less than 20% in both Montana and the U.S. Notably, Tdap immunization rates have been much higher (≥ 25 percentage points) than for all other teen vaccines each year.¹

Looking to the future As the childhood and adolescent immunization rates improve in Montana, it is important to continue to work toward higher coverage levels. More work is needed to achieve the Healthy People 2020 goal of 80% immunization coverage for the 4:3:1:3:3:1:4 series for children aged 19–35 months. Recommendations to improve immunization rates appear below.

Figure 2. Estimated 2012 Vaccination Comparison Coverage Among Adolescents Aged 13-17 Years Montana and the United States



Recommendations for clinicians, health departments, and others who care for children

Clinicians

- Follow guidelines: provide age-appropriate vaccinations as recommended by the Advisory Council on Immunization Practices (ACIP) and the American Academy of Pediatrics (AAP).
- Use opportunities to vaccinate: use each patient visit as an opportunity to vaccinate; reduce missed opportunities, e.g., use simultaneous vaccinations when appropriate.
- Reminder/recall systems: establish office practices that remind clinicians when vaccines are due, and recall patients who are due for vaccination.
- Educate and encourage: educate parents about the importance of vaccination for their children, and encourage parents to be sure their children are up-to-date with vaccinations.

Local Health Departments, child care providers, school officials, and stakeholders

- Examine and use data: the Montana Immunization Program provides local area childhood immunization data to each local health department — use these data to assess immunization coverage; establish systems to remind, recall, and vaccinate children; and assure up-to-date immunization coverage for Montana children.
- Emphasize partnerships: work with your local partners to identify children who fall behind on immunizations and get those children immunized. Key partners include WIC, Healthy Mothers/Health Babies, Headstart, and health care providers.

For more information, contact the Montana Immunization Program at 406-444-5580 or at HHSIZ@mt.gov

References:

1. <http://www.cdc.gov/nchs/nis>

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